

REMARKS

This Amendment Accompanying Request for Continued Prosecution responds to the Official Action of 26 September 2003 in the above-identified application, which Official Action the Examiner designated as being FINAL.

Claims 1-37 were originally presented. Claims 26-37 were elected for further prosecution and Claims 1-27 were cancelled, without prejudice. Claims 38-47 were subsequently added Amendment. The present Amendment amends Claims 28, 30, 35-40, 44 and 46-47, and adds Claims 48-55. Accordingly, upon the entry of the foregoing Amendment, the claims under active prosecution in this application will be Claims 26-55.

The claims as they will stand upon the entry of the foregoing Amendment are set forth in full herein as required by the Rules.

More particularly, in the currently outstanding FINAL Official Action, the Examiner has:

1. Failed to re-acknowledged Applicants' claim for foreign priority under 35 USC 119(a)-(d) or (f), and also to re-acknowledged the receipt of the required certified copy of the priority documentation by the United States Patent and Trademark Office.
2. Provided Applicants with a copy of a Notice of References Cited (Form PTO-892) and copies of each of the references cited therein.

3. Failed to acknowledge (but subsequently, in response to Applicants' Amendment After Final Rejection acknowledged) Applicants' Information Disclosure Statement submitted on June 26, 2003 by providing Applicants with a copy of the Form PTO-1449 that accompanied that filing duly signed, dated and initialed by the Examiner in confirmation of consideration of the art listed therein;
4. Failed to reconfirm that the drawings originally filed with this application have been accepted;
5. Acknowledged Applicants cancellation of Claims 1-27, without prejudice;
6. Acknowledged Applicants' previous argument to the effect that the Warnok et al reference was inapposite to the present invention because it is directed to storing an entire document in computer memory as a Portable Document Format document and therefore does not teach recording display data in pre-specified units having display information and scroll display information as presently claimed, and indicated that he has refused to read any limitation concerning the setting of the scroll speed at the speed set by the creator because such action on his part would improperly read limitations present only in the specification into the claims;
7. Objected to Claims 36 and 46 as being in improper dependent form;
8. Rejected Claims 35 and 44 under 35 USC 112, second paragraph, as being indefinite in phraseology;

9. Rejected Claims 28-47 under 35 USC 102(e) as being anticipated by the Portable Document Format Reference Manual, Version 1.2; and

10. Rejected Claims 32 and 42 under 35 USC 103(a) as being unpatentable over the Portable Document Format Reference Manual, Version 1.2, in view of Japanese Patent No.5-323941.

No further specific comment regarding items 1-6 above is deemed to be required in these Remarks.

With respect to item 7, the Examiner has suggested that Claims 36 and 46 are in improper dependent form. Applicants respectfully disagree. Claims 36 and 46 are directed to a **display device** that reproduces and displays the information stored on the storage medium previously claimed based upon the scroll display control information. This is not simply a preamble. A device is claimed that utilizes the storage medium previously claimed thereby further limiting the previous claim in an appropriate manner.

Nevertheless, in the interest of furthering the prosecution of this application, Applicants are proposing that Claims 36 and 46 be rephrased in more traditional apparatus format, i.e., as comprising "a display controller for performing scroll display based on the scroll display information". Applicants respectfully submit that entry of these amendments will remove the bases for the Examiner's objections to Claims 36 and 46 without introducing any new matter into this application or introducing any issue requiring further consideration and/or search.

With respect to item 8, the Examiner has rejected Claims 35 and 44 under 35 USC 112, second paragraph, on the bases that (i) the words "such as" render claim 35 indefinite, and (ii) claim 44 is indefinite because there is nothing modified by the adjective "associated". By the foregoing Amendment, Applicants have proposed that the phraseology that the Examiner feels renders Claims 35 and 44 indefinite be cancelled. Applicants respectfully submit that entry of these Amendments will remove the bases for the Examiner's rejections under 35 USC 112.

The remaining amendments are proposed for the purposes of (i) correcting a typographical error, (ii) adjusting the wording of Claims 37 and 47 in accordance with the new phrasing of their respective parent claims, (iii) clarifying Claims 28 and 38 by incorporating the subject matter of Claims 30 and 40 respectively therein, (iv) amending original Claims 30, 34, 40 and 44 in a manner that distinguishes those claims from the cited art the cited references, and (v) adding new Claims 48-55. No new matter is added.

With respect to items 8 and 9, the Examiner has rejected (i) Claims 28-47 and 33-37 under 35 USC 102(b) as being anticipated by the Portable Document Format Reference Manual, and (ii) Claim 32 under 35 USC 103(a) as being unpatentable over the Portable Document Format Reference Manual in view of the Ota reference (Japanese Patent No. 5-323941).

Applicants appreciate the Examiner's detailed analysis of the present claims in light of the cited Portable Document Format Reference Manual. Unfortunately, however, Applicants must respectfully submit that that reference, like the Warnok, et al reference previously cited and distinguished from the claims of this application, is directed to storing an **entire document or the like** in a computer memory as a so-called "PDF (Portable Document Format) document".

The difference between the reference relied upon in support of the previous rejection and the reference relied upon in support of the present rejection is as follows. In the previously relied upon reference the components of an article contained within a document and the so-called "thread" connecting (associating) those components with one another was added (accomplished) **after** the document had been stored. On the other hand, in the presently relied upon reference, the definition and association of article components are accomplished **concurrently with** the storage of the document. Applicants respectfully submit, however, that this distinction is insufficient to justify the Examiner's rejections (i.e., to render the currently pending claims unpatentable).

More particularly, despite the Examiner's detailed analysis of the Portable Document Format Reference Manual upon which he currently relies, the fact remains that present invention stores the display data associated with an entire document or the like, which includes image object data, management information associated with each stored image object data and scroll information associated with each object image data, **in distinct, separately controllable pre-specified units (i.e., files) containing only a portion of all of the display data**. This is different from the so-called dynamic formatting referred to by the Warlock, et al. reference as being unsatisfactory as well as being different from the disclosures of the newly cited Portable Document Format Reference Manual in which it is necessary to store the **entire document or the like** in a computer memory as a so-called "PDF (Portable Document Format) document".

The manner in which the Portable Document Format Reference Manual describes the individual elements of that format relative to the way in which it actually works is unfortunate in the present context because the foregoing distinctions are not clear. This is believed to be the result of the fact that the PDF Reference Manual attempts to describe the Portable Document Format from the perspective of each of its different levels of complexity separately as a means of aiding program developers and others in the use of its various features.

Applicants respectfully submit, however, that a close reading of the PDF Manual clearly suggests that while the Examiner's factual analysis concerning the "bead" concept of identification of article segments and the page co-ordinate definition of each article segment seems to be supported by the PDF Manual, the Examiner has forgotten (or not noticed) that ***no matter how one approaches the PDF format, it is necessary in the use of each pre-specified unit (page, or article portion in the present context) to refer back to information stored as part of the whole PDF file outside of the so-called "pre-specified unit" (Note: the PDF Reference Manual discusses PDF files as representative of entire documents including a header, a body, a cross-reference table and a trailer (see chapter 5) wherein the body is made up of various indirect objects such as fonts, pages and sampled images, see page 62).***

Thus, despite other similarities to the present invention, in the article and/or page context, the PDF Reference Manual makes it clear that each selected portion of a so-called page that is defined by the so-called "beads" must refer back to the so-called "Contents" parameter of the page of which it forms a part. Hence, each article portion must refer back at least to the page information from which it is extracted in order to be appropriately utilized in a scrolling display of an entire article (particularly an entire article having different portions on different pages).

In fact, while it may be possible to create PDF pre-specified units containing separate document pages, there is no provision for saving the defined article segments as pre-specified units (Claim 28) or distinct files (claim 38). Further, while the PDF Manual at certain points seems to broadly suggests that each so-called "page" may be basically separate unto itself as an abstract concept, the true, real world fact is that at least part of the display information and associated scroll information for each such page depends upon information created and saved in the body portion of the PDF file outside of the page in question during the course of the creation and saving of an entire PDF format type document.

In other words, the pre-specified units of the present invention to the extent that they individually represent pages or article portions contain within themselves their own display information and scroll display control information. The PDF Document Format, on the other hand, does not truly contemplate that each so-called "page" is to be a pre-specified unit in the sense of the present invention. This is because the display control and scroll display information, for example the required drivers, are embedded in the PDF file and associated with the data to be displayed by higher level operators associated with the data via catalogs that assemble the various objects making up the body of the PDF file to achieve the desired document display. Thus, while the PDF Reference Manual at first reading appears to be discussing the manipulation of documents, pages of documents and article threads running through the documents, a more detailed reading of that manual suggests that the foregoing is but the highest level of explanation of the actual PDF concept.

When reduced to its basics, therefore, the PDF concept stores documents in the form of pages separately from at least some of the data contemplated as being necessary for display of the individual data, and separately from all of the other information necessary for the association of that data in the form of appropriate control sequences including the parameters required to achieve the association and control of the display of various combinations of the data as desired. Accordingly, the PDF Manual suggests that the PDF concept might be characterized as including a PDF file containing all of the information making up the document in a database sort of collection (the so-called "body") including various levels of association of that data that can be accessed and displayed or otherwise used. Hence, it is clear that the so-called "threads" connecting the various portions of an article in the PDF Reference Manual are not the same as (or even akin to) the vectors within the article components of the present invention as has been clarified by the above-proposed amendment of Claims 28 and 38.

In support of this interpretation, Applicants respectfully call attention to the fact that at page 27 of the PDF Manual it is indicated that a PDF file contains a PDF document ***and other supporting data***. Further, the PDF Manual states that ***in addition to a document a PDF file contains the version of the PDF specification and information about the location of important structures within the file***. Further, at page 28 the PDF Manual indicates that the required printer driver consists of a stream of commands ***that are converted into PDF operators which are embedded in the PDF file***. Also, at page 62 the PDF Manual indicates that the body of a PDF file consists of a sequence of indirect objects representing a document, and that ***those objects represent components of the document such as fonts, pages and sampled images***.

Hence, it is not surprising that in the discussion of optimized PDF files the PDF Manual notes that it is contemplated that ***the pages will share objects and resources***. It also is not surprising that the various pages are contemplated to have ***common attributes and that those attributes may and will be “inherited” from the preceding page unless otherwise specified***. See, pp 77-78; Section 7.4 and pp. 254, 270 and 274.

Accordingly, as emphasized above the PDF Manual does not disclose that the management information and scrolling information associated with each image data object is maintained in association with it in the pre-specified unit (file) within which it is stored, and that a complete formatted document is reproduced using the management information and scrolling information of the various distinct units (files) in linked association with one another. This is clear simply by loading a PDF document from the internet. Specifically, the entire document must be loaded before any of it is displayed for use within the PDF document readers commonly available.

Applicants further respectfully submit that the Examiner has misunderstood the Applicants' use of the word "intervals" in the claims of this application as applying to parameters akin to the "R" parameter of the PDF Reference Manual which identifies the article section. In fact, however, the claimed "intervals" more closely correspond to the "V" and "N" parameters of the PDF reference Manual. Thus, it will be understood that in the present specification the Partial Blocks are identified in Fig. 37 as the "intervals", whereas, the Examiner appears to have thought that the "beads" (article sections) in the PDF Reference Manual correspond to the "intervals" of the present application. To clarify this point, the claims have now been amended so as to clarify the fact that the "intervals" are meant to refer to portions of the scroll path itself in the present invention contrary to the meaning imposed upon that wording by the Examiner previously herein.


In addition, the "R" parameter of the PDF Reference Manual is not associated with the scale of enlargement or reduction as the Examiner appears to argue. Accordingly, in clarification of this point, Claims 34 and 44 now have been amended by the deletion of the words "information for specifying" from the phrase "information for specifying a scale of enlargement or reduction of a display area".

In view of the foregoing Amendment and Remarks, it is respectfully submitted that all of the claims that will be present in this application upon the entry of the foregoing Amendment are in condition for allowance. Reconsideration and allowance of this application in response to this communication, therefore, is respectfully requested.

Applicants also believe that additional fees beyond those submitted herewith are not required in connection with the consideration of this response to the currently outstanding Official Action. However, if for any reason a fee is required, a fee paid is inadequate or credit is owed for any excess fee paid, you are hereby authorized and requested to charge and/or credit Deposit Account No. **04-1105**, as necessary, for the correct payment of all fees which may be due in connection with the filing and consideration of this communication.

Respectfully submitted,

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SIGNATURE OF PRACTITIONER

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